

REMARKS

Claims 1-31 were pending in the application. Claims 1, 14, 19, 22, 25, 27 and 28 are amended herein, and new claims 32-35 have been added. Accordingly, claims 1-35 are now pending in the application. Applicant respectfully requests reconsideration of the application in view of the amendment to the claims and the following remarks.

Claim Objections

Claim 19 was objected to because of informalities. Line 11 of claim 19 contains the word 'may', which was objected to as indefinite. Claim 19 has been amended to replace "may receive" with the definite limitation "are capable of receiving."

Claim Rejections - 35 U.S.C. § 103

Claims 1-2, 5-7, and 22-24 were rejected under 35 U.S.C. 103(a) as being unpatentable over Bellenger et al. (U.S. 6,263,016) in view of Oliver et al. (U.S. 6,064,693).

Claims 3-4 and 8-11 were rejected under 35 U.S.C. 103(a) as being unpatentable over Bellenger et al. (6,263,016), in view of Oliver et al (6,064,693), and in view of Baum et al. (U.S. 5,841,842).

Claims 12 and 13 were rejected under 35 U.S.C. 103(a) as being unpatentable over Bellinger et al. (U.S. 6,263,016) in view of Oliver et al (U.S. 6,064,693) further in view of Entenman (U.S. 4,245,342).

Claims 14, 16-17, 19, 21, and 25-31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Richmond et al. (U.S. 6,308,286) in view of Thaweethai et al (U.S. 5,546,379).

Claims 15 and 20 were rejected under 35 U.S.C. 103(a) as being unpatentable over Richmond et al. (U.S. 6,308,286) in view of Thaweethai et al. (U.S. 5,546,379) further in view of Entenman (U.S. 4,245,342).

Claim 18 was rejected under 35 U.S.C. 103(a) as being unpatentable over Richmond et al. ((U.S. 6,308,286) in view of Thaweethai et al. (U.S. 5,546,379) further in view of Evans et al (U.S. 6,307,880).

Each of these rejections is respectfully traversed in view of the amendments to the claims and the following remarks.

Bellenger was used as a primary reference in rejecting many of the claims. Bellenger discloses primary DSP resources located on each line card and "global" and "backup" DSP

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resources to handle some modem processing. The basic concept of Bellenger is to decrease resource and bandwidth waste by detecting when a particular modem connection is idle, and taking one of several actions, including terminating the connection or slowing the data rate and pushing the connection to the line card DSP resources until the idle state ends. Bellenger appears to disclose, at least for the slow data rate "sleeping" connections, transferring transmission parameters such as baud rate and symbol sets between DSP resources. Bellenger neither teaches nor suggests any provision for compensating for modem failure.

The other primary reference used to reject the claims is Richmond. Richmond discloses redundant modem systems that similarly save configuration parameters to a backup modem so that the backup modem can be substituted in case of failure of an active modem.

Neither Bellenger nor Richmond (nor the secondary references based on Applicant's limited review of them) apparently teach or suggest saving link control information for a data link. Thus even though Richmond may recover the physical signaling format of a failed modem, Richmond does not disclose a system that can compensate for loss of framing and link control when a modem handling a packet data link fails. Bellenger also fails in this respect, as Bellenger's modems merely deliver a bit stream to a remote service provider.

Accordingly, the independent claims pending in the current application have been amended to specify that the internal state information developed by a resource over the course of a connection includes data link control information, e.g., as supported by Figure 5 and the description starting at page 13, line 11 of the specification, among other places. The references of record in the present application fail to teach or suggest the invention as claimed including data link control information as claimed, and therefore do not create a *prima facie* case of obviousness for any pending claim as applied in the current rejections. Applicant respectfully requests that the obviousness rejections be withdrawn in view of the current amendments and these remarks.

Several of the Examiner's remarks were either not understood or do not seem to be supported by the cited references. Regarding claims 10 and 11, Applicant finds no teaching or suggestion of a simultaneous transfer of multiple connections between resources in the cited references. Regarding claims 12 and 13, Applicant could not locate the asserted teaching of Entenman that "no data" is a fault condition. Further, it is clear in Bellenger that "no data" is not a fault condition, and therefore Applicant fails to see how one reference can negate the explicit teachings of another reference dated 20 years later. In any event, the references do not teach a condition for a resource switchover as a removal of a resource as claimed in claim 13.

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New Claims

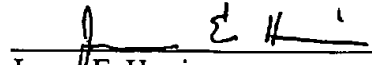
Claims 32-35 have been added to claim specific aspects of saving data link control information, as supported, e.g., by Figure 5 and the specification at pages 13 and 14. These aspects of the present invention are neither taught nor suggested by the references of record, and thus Applicant asserts that the new claims are patentable. No new matter has been added by amendment.

Conclusion

For the foregoing reasons, reconsideration and allowance of claims 1-35 of the application as amended is solicited. The Examiner is encouraged to telephone the undersigned at (503) 222-3613 if it appears that an interview would be helpful in advancing the case.

Respectfully submitted,

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